1.0 Introduction

The Contractor shall be responsible for fully executing the Firm Fixed Price Remediation (FFPR) approach under a Performance-Based Contract (PBC), by: conducting required environmental restoration services for which the United States Department of the Army (the "Army") is statutorily responsible; addressing any and all unforeseen environmental, scheduling, and regulatory issues; and, assuming contractual liability and responsibility for the achievement of the performance objectives for the cleanup sites at the [Installation] (the "Installation") identified in this Performance Work Statement (PWS), including any sites with off-installation contamination for which the Army is responsible. Contractors should note that "Unforeseen environmental issues" include unknown and/or varied concentrations of contaminants at cleanup sites (off-installation areas included) identified in this PWS, but not unknown sites (e.g., sites not identified in this PWS).

[The following list of required capabilities will be installation-specific and may require revision of the "following note" and Section 5.11.] The Contractor must have the capability and experience to perform, or provide, a wide range of investigative, remedial design, remedial construction, and remediation services required for hazardous substance and waste sites, munitions and explosives of concern (MEC), and chemical warfare materiel (CWM). [The following note will be installation-specific] Contractors should note that under this PWS the Contractor will not perform MEC/CWM work; however, the Contractor should be familiar with and be able to recognize MEC/CWM and then notify the Army of potential condition. Work will include, for example, site investigation, site characterization, evaluation of remedial alternatives, remedial design, remedial construction, remediation of contaminated sites, remedial action (operations), and long-term management.

It is the Contractor's responsibility to comply with all applicable federal, state and local laws and regulations and to fulfill the performance objectives of this PWS in a manner that is consistent with any applicable orders or permits, all existing and future cleanup agreements or guidance for the Installation, and relevant Department of Defense (DoD) and Army policy, for the duration of the contract. It is the Contractor's responsibility to comply with all necessary insurance requirements, specifically set forth in Section 5.6.

[The following paragraph will be installation-specific.] The Contractor must perform all the necessary environmental remediation work as required to meet the performance objectives of this PWS. Remediation is being conducted pursuant to Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), as amended by the Superfund Amendments and Reauthorization Act (SARA), and National Oil and Hazardous Substances Contingency Plan (NCP) requirements, with regulatory coordination, as appropriate, of the [State Agency] and the United States Environmental Protection Agency (USEPA) Region [Number]. Additionally work may be conducted pursuant to Resource Conservation Recovery Act (RCRA) or other applicable authorities.

[The following paragraph will be installation-specific.] The Installation was proposed for the National Priorities List (NPL) in [Date] due to [Reason]. The Installation was placed on the NPL in [Date]. [Regulatory Agencies] and the Army signed a Federal Facilities Agreement (FFA) on [Date].

[The following paragraph will be included for installations with unregulated contaminants and CERCLA as the regulatory driver.] Certain pollutants or contaminants (P/C) may be an issue at

sites covered by this PWS. Cleanup of P/C may be warranted if the P/C presents an imminent and substantial endangerment to the public health or welfare that results in an unacceptable risk. P/C, as defined in CERCLA, typically do not have a federally promulgated maximum contaminant limit (MCL). For any such P/C, or any other chemical, that does not have a federally promulgated MCL, but does have a finalized reference dose (RfD) or slope factor listed in USEPA's Integrated Risk Information System (IRIS) database, that RfD or slope factor should be incorporated in the NCP risk assessment process. However, funding will not be provided for responses that are not in full compliance with CERCLA, RCRA, the Defense Environmental Restoration Program (DERP), and DoD and Army policy. Additionally, state standards will only be analyzed through the CERCLA applicable or relevant and appropriate requirement (ARAR) process.

The following paragraph will be included for installations with unregulated contaminants and RCRA as the regulatory driver.] Certain pollutants or contaminants (P/C) may be an issue at sites covered by this PWS. Cleanup of P/C may be warranted if the P/C presents an imminent and substantial endangerment to the public health or welfare that results in an unacceptable risk. P/C typically do not have a federally promulgated maximum contaminant limit (MCL). For any such P/C, or any other chemical, that does not have a federally promulgated MCL, but does have a finalized reference dose (RfD) or slope factor listed in USEPA's Integrated Risk Information System (IRIS) database, that RfD or slope factor should be incorporated in the risk assessment process. However, funding will not be provided for responses that are not in full compliance with CERCLA, RCRA, the Defense Environmental Restoration Program (DERP), and DoD and Army policy. Additionally, state standards will only be analyzed through the appropriate statutory analysis for applicable standards and requirements.

2.0 Performance Objectives and Standards

The performance objectives and standards for this PWS are outlined in Table 1. Contractors should note that the current status of the remediation efforts for each site can be found in Section 6.0: Installation and Site Information. Additional documentation is provided with the Request for Proposal (RFP) package.

[Note: Table 1 may be specified by media type (e.g., Soil sites should be able to go to RC; Groundwater is more likely to be RIP]

Table 1: Performance Requirements Summary.

| Performance Objective | Performance Standards |
|---|---|
| Approved Project Management Plan (PMP) and Quality Assurance Surveillance Plan (QASP): Draft PMP and QASP within 30 days of Task Order award, Final PMP and QASP within 30 days of receipt of COR comments on the drafts. | Army approval through the Contracting Officer's Representative (COR). |

| Performance Objective | Performance Standards |
|---|--|
| Achieve Remedy in Place (RIP) at the following sites by [Date]: [List of RIP Sites] | Compliance with the FFA and associated schedule [if applicable] |
| Upon achievement of RIP, perform Remedial Action (Operations) (RA(O)) at the above sites for the duration of the contract or until achievement of Response Complete (RC), whichever comes first. Upon achievement of RC, perform any necessary Long-Term Management (LTM) at the above sites for the duration of the contract. RA(O)/LTM includes development and implementation of an exit or ramp-down strategy for RA(O) activities at each site. | Army approval through the COR and Regulator approval/concurrence/acceptance [depends upon regulatory structure] (e.g., receipt of documentation confirming RIP/RC; RA(O)/LTM exit or ramp down strategy; annual RA(O)/LTM reports incorporating requirements of the exit or ramp down strategy). |
| Perform RA(O) at the following sites for the duration of the contract or until achievement of RC, whichever comes first: [List of RA(O) Sites] Upon achievement of RC, perform any necessary Long-Term Management (LTM) at the above sites for the duration of the contract. | Army approval through the COR and Regulator approval/concurrence/acceptance (e.g., RA(O)/LTM exit or ramp down strategy; annual RA(O)/LTM reports incorporating requirements of the exit or ramp down strategy). |
| RA(O)/LTM includes development and implementation of an exit or ramp-down strategy for RA(O) activities at each site. | |
| Achieve RC at the following sites by [Date]: [List of RC Sites] | Compliance with FFA and associated schedule [if applicable] |
| Upon achievement of RC, perform any necessary Long-Term Management (LTM) at the above sites for the duration of the contract. LTM includes development and implementation of an exit or ramp-down strategy for LTM activities at each site. | Army approval through the COR and Regulator approval/concurrence/acceptance (e.g., receipt of documentation confirming RC; LTM exit or ramp down strategy; annual LTM reports incorporating requirements of the exit or ramp down strategy). |
| Perform any necessary LTM at the following sites for the duration of the contract: [List of LTM Sites] LTM includes development and implementation of an exit or ramp-down strategy for LTM activities at each site. | Army approval through the COR and Regulator approval/concurrence/acceptance (e.g., approval of LTM exit or ramp down strategy; approval of annual LTM reports incorporating requirements of the exit or ramp down strategy). |
| For all remedies, optimize capital and long-term costs. | Acceptance by the COR that the Contractor has demonstrated that the proposed remedy represents the lowest 30-year present worth cost to the Army, and is acceptable to the regulators. |
| Complete all CERCLA 121(c) reviews required for the sites identified above, for the duration of the contract. Correct any deficiencies noted in the CERCLA 121(c) reviews. | Army approval through the COR and Regulator approval/concurrence/acceptance (e.g., formal documentation accepting the reviews and any corrections). |
| Consolidate CERCLA 121(c) reviews into a single installation-wide review conducted at the conclusion of the contract. | reviews and any corrections). |
| [Additional installation-specific performance objectives, such as "Achieve levels of <2ppb RDX at the identified point of compliance."] | Army approval through the COR and Regulator approval or concurrence (e.g., documentation acknowledging that objective was achieved in a manner acceptable to Army and Regulators). |

Contractors should note that Remedy in Place, Remedial Action (Operations), Response Complete, and Long-Term Management are terms used for Defense Environmental Restoration Program. These terms are defined in Attachment C.

Contractors should note that when RA(O), LTM and/or a CERCLA 121(c) review is necessary as a result of the Contractor's remediation activities at a site, the Contractor shall be responsible for the following:

- Performing the required RA(O) and/or LTM at that site for the duration of the contract.
- Conducting any CERCLA 121(c) reviews required at that site for the duration of the contract.
- CERCLA 121(c) reviews conducted during the duration of the contract constitute a Government Inspection of Services. The Contractor will correct any problems and/or deficiencies noted by during RA(O), LTM or within a CERCLA 121(c) review. If reperformance is required to correct the deficiencies noted during RA(O), LTM or within a CERCLA 121(c) review, the Contractor may be required to modify the existing remedy, implement a contingent remedy, modify the monitoring parameters and/or frequency, or take other activities deemed necessary to correct the deficiencies. Corrective action must be certified and approved consistent with Section C.6.1 of the basic contract. If the Contractor is conducting RA(O) or LTM, or completing a CERCLA 121(c) review, for a remedy that they did not implement or modify (i.e., an on-going pump and treat system inherited as part of the PBC scope), correction of substantive remedy deficiencies noted during RA(O), LTM or within a CERCLA 121(c) review which may require modification of that remedy are considered outside the scope of this contract effort.

There may be multiple milestones and/or deliverables for each performance objective (see Section 3.4 and Section 7.0). Partial payments will be based on successful completion of the milestones. Final decisions regarding the adequacy of milestone and deliverable completion resides with [Installation]'s COR (see Section 5.1), with appropriate acceptance and approval of necessary site remediation documentation by regulators, consistent with applicable regulatory drivers listed in Section 1.0 of this PWS. For the duration of the contract, the Contractor shall remain responsible for correction of remedy deficiencies noted during RA(O), LTM, and CERCLA 121(c) reviews.

3.0 Project Management

The PBC approach requires careful coordination of project activities to ensure that all stakeholders are kept informed of the project status, existing or potential problems, and any changes required to prudently manage the project and meet the needs of the Installation's project stakeholders and decision-makers. The Contractor shall be responsible for the following project management activities:

3.1 Project Management Plan

The Contractor shall develop and maintain a detailed Project Management Plan (PMP). The PMP, based on the schedule prepared as part of the Contractor proposal, shall specify the schedule, technical approach, and resources required for the planning, execution, and completion of the performance objectives. The first draft of the PMP shall be due within thirty (30) days of contract award. Elements of this draft PMP shall be part of the offeror's proposal submittal. The draft PMP and subsequent revisions shall be subject to Army review and approval, through the COR. The final PMP shall be due within 30 days of receipt of COR comments on the draft

PMP. A payment milestone will be established for Army approval of the final PMP through the COR.

As part of the PMP, the Contractor shall develop and maintain a Resource-Loaded Schedule that fully supports the technical approach and outlines the due dates and cost expenditure percentages for all milestones and payable deliverables. A payment plan shall be included with the schedule that may allow for partial payments to the Contractor based on successful completion of interim milestones proposed by the Contractor. Activities identified in the QASP should be appropriately coded in the project schedule to allow for planning of QA inspections. It is the Army's intent to make all payments after verification of milestone completion in accordance with this schedule. Unless otherwise noted in Table 1, all performance objectives must be completed within the allowable contract period of performance, provided all contract options have been exercised. The Contractor shall need to take into account the existing or future schedules developed under the applicable regulatory drivers listed in Section 1.0 of this PWS. The Contractor shall also need to coordinate activities with the COR to ensure that the proposed project schedule does not conflict with other contractor activities on site, or interrupt Installation mission activities.

As part of the PMP, the Contractor shall identify and implement a means for providing project status reports to the COR. The PMP shall address the frequency and content of status reports.

The Contractor shall update the PMP to reflect progress towards achievement of the performance objectives and delineate proposed actions to accomplish future project milestones.

3.2 Additional Site Plans

Prior to beginning any field work the Contractor shall prepare any additional plans or documents (e.g., sampling and analysis plans, quality assurance project plan, waste minimization plans, health and safety plans) consistent with the applicable regulatory drivers listed in Section 1.0 of this PWS, and any other agreements, orders, or regulations that apply to the Installation and sites. These plans and documents shall be subject to Army review and approval, through the COR.

3.3 Quality Management

The Contractor must ensure that the quality of all work performed or produced under this contract meets Army approval, through the COR. Quality control/assurance plans must be prepared and approved by the COR prior to performance of physical work.

Because the technical approach for this PBC shall be developed by the Contractor, the Contractor shall also develop a proposed Quality Assurance Surveillance Plan (QASP). . A Draft and Final QASP shall be submitted with the PMP deliverables in accordance with Table 1 using the sample QASP template provided in Attachment D. The Final QASP shall incorporate Army review comments and will be approved by the COR within thirty (30) days of receiving the final approved PMP.

The QASP should highlight key quality control activities or events that the COR will use to determine when Army (COR or Contracting Officer (KO)) inspections can be conducted to assess progress toward and/or completion of milestones. Activities identified in the QASP should be appropriately coded in the project schedule to allow for planning of QA inspections.

3.4 Milestone Presentations

Milestone presentations shall be made to the COR at the completion of each milestone below to provide analysis and lessons learned, and to present approaches for completion of future milestones. At the COR's request, the Contractor may also make milestone presentations to the other project stakeholders, consistent with the applicable regulatory drivers listed in Section 1.0 of this PWS, to show achievement of the performance objectives. This includes participation in annual Installation Action Plan (IAP) meetings, if requested by the COR.

The Contractor may propose a revision of the milestones below to reflect their PMP and provide for interim milestones. Interim milestones will only be accepted if they represent significant progress toward milestone completion, and completion of these interim steps can be measured and demonstrated. As noted in Section 2.0, partial payments will be tied to the successful completion of the following milestones or an interim milestone plan approved by the Army, through the COR. To that end, all proposed interim milestones should be associated with easily demonstrated metrics tied to performance measurements (e.g., final acceptance of a report rather than submission of a draft). All milestones must have a defined means for demonstrating completion in order to facilitate certification and approval (see Section 5.1).

Major Milestones

- Approval of the Project Management Plan
- Achievement of (acceptance/approval of) RIP at [Site] by [Date]
- Approval of annual RA(O) reports
- Approval of an exit or ramp-down strategy for RA(O)
- Achievement of (acceptance/approval of) RC at [Site] by [Date]
- Approval of annual LTM reports
- Approval of an exit or ramp-down strategy for LTM
- Approval of the CERCLA 121(c) review(s)
- Successful correction of deficiencies noted in the CERCLA 121(c) review(s)

3.5 Environmental Requirements

The Contractor shall identify: applicable Federal, State and Local laws and regulations; applicable Installation-specific orders, agreements, or rules; and perform its work in accordance with said authorities. The Contractor shall ensure that all activities performed by its personnel, subcontractors and suppliers are executed in accordance with said authorities. Any incident of noncompliance noted by the Contractor shall immediately be brought to the attention of the COR and Installation [or "facility operator" if applicable] telephonically and then by written notice. Nothing in this contract shall relieve the Contractor of its responsibility to comply with applicable laws and regulations. The Contractor shall obtain all permits, licenses, approvals, and/or certificates required or necessary to accomplish the work. When the work to be performed requires facility clearances, such as digging or drilling permits, the Contractor shall obtain such clearances and/or permits, with the assistance of the installation point of contact, prior to any drilling or excavating operations. The Contractor shall coordinate all such work with Installation maintenance personnel prior to performing work. Contractors on environmental sites are required to perform their own utility checks based on Installation-supplied utility maps. The Contractor shall comply with all Installation- or site-specific time and procedural requirements (federal, state, and local) described in the permits obtained. The Army technical

experts will also independently review Contractor work to ensure compliance with all applicable requirements.

The following paragraph will be installation-specific.] The Army has/will establish/ed a Standard Operating Procedure and a Geographic Information System (GIS)-based tracking system to ensure the Land Use Controls (LUCs) are enforced. The LUCs will/have been incorporated into the post-wide Master Plan and compliance with LUCs will be reported in the Monitoring Reports for each site. The LUC policy applies to all units and activities, Military and Civilian Support Activities, tenant organizations and agencies and Government and Civilian Contractors. Compliance with the LUC policy is required in all RA(O), LTM and CERCLA 121(c) review activities.

3.5.1 Protection of Property

The Contractor shall be responsible for any damage caused to property of the United States (Federal property) by the activities of the Contractor under this contract and shall exercise due diligence in the protection of all property located on the premises against fire or damage from any and all other causes. Any property of the United States damaged or destroyed by the Contractor incident to the exercise of the privileges herein granted shall be promptly repaired or replaced by the Contractor to a condition satisfactory to the COR or reimbursement is made by the Contractor sufficient to restore or replace the property to a condition satisfactory to the COR in accordance with FAR Clause 52.245-2.

3.6 Health and Safety Requirements

The Contractor shall implement a written Safety and Health Program compliant with federal, state, and local laws and regulations and approved by the KO. The Contractor shall ensure that its subcontractors, suppliers and support personnel comply with the approved Site Safety and Health Plan (SSHP). The Army reserves the right to stop work under this contract for any violations of the SSHP at no additional cost to the Army. Once the Army verifies through the COR that the violation has been corrected, the Contractor shall be able to continue work. As a minimum, the SSHP shall contain the following elements: site description and contaminant characterization, safety and health hazard(s) assessment and risk analysis, safety and health staff organization and responsibilities, site specific training and medical surveillance parameters, personal protective equipment (PPE) and decontamination facilities and procedures to be used, monitoring and sampling required, safety and health work precautions and procedures, site control measures, on-site first aid and emergency equipment, emergency response plans and contingency procedures (on-site and off-site), logs, reports, and record keeping.

3.7 Quality Control Testing

Chemical Quality Control shall be provided whenever sampling or analysis for chemical constituents is required in order to achieve milestones. Quality control for traditional soils or geotechnical testing shall also be included. The laboratory(ies) to be used by the Contractor shall be National Environmental Laboratory Accreditation Program (NELAP) certified or equivalent. The Contractor may establish an on-site testing laboratory at the project site if determined necessary by the Contractor. However, on-site testing shall meet the requirements of USEPA, specific state regulator requirements, and all requirements of the DoD Quality Systems Manual, Version 2.

3.8 Project Repository and Administrative Record

The Contractor shall update at least monthly a multimedia (i.e., both paper and electronic format) project repository of all project-related information to ensure that pertinent documentation and data are available for project reviews, and to provide a clear record of the PBC approach to support final decisions and remediation completion. This repository is the property of the Army and available to the Army upon request by the COR or KO. A project repository is currently maintained at [Location].

"Project-related information" includes all previous environmental restoration documentation of a technical nature developed by the Army and previous Army contractors for the sites specified in this PWS, and all the documentation developed by the Contractor in order to achieve the performance objectives specified in this PWS. Documents generated prior to the PBC are not expected to be stored in electronic format; however, all documents generated by the Contractor shall be maintained in multi-media form.

The Contractor shall also update the repositories for the Administrative Record for CERCLA activities established at [Location], as needed. The project repository and Administrative Record shall be updated by the Contractor, and made available to the public, for the duration of the contract.

3.9 Army Environmental Database and Environmental Restoration Information System

Once a site identified in this PWS has achieved Response Complete (i.e., appropriate documentation is finalized), the Contractor shall be responsible for providing the COR with the data and documentation necessary for the closeout of each site in the Army Environmental Database - Restoration Module (AEDB-R). In addition, the Contractor shall electronically submit all generated analytical data into the Environmental Restoration Information System (ERIS). Information regarding ERIS is available online at http://aec.army.mil/usaec/reporting/eris00.html. The Army, through the COR, will provide data specifications for AEDB-R and ERIS to the Contractor. The Contractor shall comply with all applicable requirements for data validation and submission.

3.10 Regulatory Involvement

All regulatory coordination shall be approved by the Army through the COR. The Contractor shall provide the necessary support to initiate, schedule, and address all regulatory aspects of the project (e.g., organizing discussions with regulators concerning site response objectives and completion requirements, obtaining regulator comments on site documents and appropriately addressing them, and obtaining written documentation of remediation completion from the regulators for all of the sites identified in this PWS). The COR, or designee, will attend and represent the Army at all meetings with the regulators. With approval of the COR, the contractor may also informally discuss remediation issues with regulators and provide an after-action report back to the COR. The Army will be the signature authority for all regulatory agreements and remediation documentation.

3.11 Public Involvement

All public participation coordination shall be approved by the Army through the COR. The Contractor shall provide the necessary support to initiate, schedule, and address all public

participation aspects of the project (e.g., preparation of briefings, presentations, fact sheets, newsletters, articles/public notices to news media, and notifications to Restoration Advisory Board (RAB) members). The Contractor shall be responsible for requesting and addressing all public comments consistent with the applicable regulatory drivers listed in Section 1.0 of this PWS. The COR, or designee, will attend and represent the Army at all meetings with the public.

The following paragraph will be installation-specific.] Contractors should note that the Installation has an active RAB and detailed information concerning the RAB's organization and activities will be provided to the Contractor. Activities required to support the RAB meetings are included in this effort. The Contractor shall be responsible for the minutes of all RAB meetings and shall submit these minutes to the COR for approval. The Contractor shall also secure a location for each scheduled meeting and shall provide all equipment to support these meetings.

3.12 Project Stakeholders

For the purposes of this PWS, project stakeholders include the Army, [Regulatory Agencies], and the RAB [If applicable]. Required level of involvement may differ from site to site and the Contractor shall be responsible for obtaining comments with appropriate approval or concurrence on project deliverables consistent with applicable regulatory drivers and agreements for each site.

3.13 Deliverable Requirements

All documents must be produced with at least draft, draft-final, and final versions. With Army concurrence, the Contractor may coordinate with appropriate regulatory agencies to determine if fewer versions of each deliverable are sufficient for review. The Army, through the COR, will receive initial draft documents and will provide comments to the Contractor within five (5) [confirm duration with installation] business days. Once initial comments are addressed, the Army will review draft documents before submission to appropriate regulatory agencies. The Contractor shall ensure that review periods are consistent with the applicable regulatory drivers noted in Section 1.0 of this PWS. All documents shall be identified as draft until completion of stakeholder coordination, when they will be signed and finalized. One copy of the final document shall be placed in both the project repository and Administrative Record (for CERCLA documents).

4.0 Expertise and Necessary Personnel

The Contractor shall provide the necessary personnel and equipment to successfully execute this PWS. The Contractor is responsible for determining the requirements for licensed professionals and certifications.

The Contractor shall furnish all plant, labor, materials and equipment necessary to meet the performance objectives. The Contractor shall provide personnel trained as required by the Occupational Safety and Health Administration (OSHA) and all other applicable federal and state regulations. The Contractor shall provide all support activities necessary to ensure the safe and effective accomplishment of all work. For all work performed under this contract, the Contractor shall also develop and implement quality control measures consistent with all applicable federal and state regulatory requirements and standards.

5.0 Additional Requirements

5.1 Certification and Approval of Project Milestones and Deliverables

The COR will be responsible for contract management, inspection, oversight, review, and approval activities. Certification and approval of project milestones by the COR is necessary before distribution of partial payments. Final acceptance of milestone completion shall include appropriate acceptance of site remediation documentation by regulators. For the duration of the contract, the Contractor shall remain responsible for correction of remedy deficiencies noted during RA(O), LTM, and CERCLA 121(c) reviews.

Certification by the Army is contingent upon the Contractor performing in accordance with the terms and conditions of the contract, this PWS, and all amendments/options.

Representatives of the U.S. Army Environmental Center (USAEC) and the Contractor shall meet with the COR at a site and time designated by the COR after receipt of each status report to:

- Formally review the quantity and quality of services;
- Inspect work for compliance with this PWS, the associated Contractor's final proposal, and project documentation;
- Accept or reject milestones and deliverables completed since the previous review; and
- Prepare, approve and submit DD Form 250 "Material Inspection and Receiving Report" for partial payments in accordance with milestone completions and approvals at the USAEC level.

5.2 Army Furnished Resources

The Army, through the COR, shall make available the following resources to the Contractor:

- Records, reports, data, analyses, and information, in their current format (e.g., paper copy, electronic, tape, disks, CDs), to facilitate development of an accurate assessment of current, former, and historical site activities and operations; waste generation and contaminant characteristics; parameters of interest; and site environmental conditions.
- Access to personnel to conduct interviews on Installation operations and activities.
- Access to DoD and Army policy and guidance documents.
- All Army owned property used for remediation purposes must be maintained by the Contractor in accordance with applicable maintenance requirements, and may not be replaced by the Army should new equipment be required.
- [Others to be determined, depending on the nature of the contract mechanism used.]

5.3 Contractor Furnished Resources

The Contractor shall be responsible for the following:

- Coordination with the Army/COR and the Installation for access to the Installation, to
 execute this PWS and comply with the procedures described during the Contractors' meeting
 at the Installation.
- Coordination with the Army/COR and the Installation in order to gain access to available infrastructure (e.g., buildings, roadways, waste management units, other Installation facilities) and utilities (e.g., electric power and telephone lines, natural gas and water supply distribution pipelines, and wastewater discharge conveyances), to execute this PWS.

- [The following bullet will be installation-specific.] The provision and cost of the utilities associated with implementation of remedies, including installation of individual meters for necessary utilities.
- All waste generated under this contract shall be the responsibility of the Contractor.
- Any other necessary resources needed to achieve the performance objectives.

5.4 Government Rights

The Army has unlimited rights to all documents/material produced under this contract. All documents and materials, to include the source codes of any software, produced under this contract shall be Army owned and are the property of the Army with all rights and privileges of ownership/copyright belonging exclusively to the Army. These documents and materials cannot be used or sold by the Contractor without written permission from the KO. All materials supplied to the Army shall be the sole property of the Army and cannot be used for any other purpose. This right does not abrogate any other Army rights under the applicable Data Rights clause(s).

5.5 Place of Performance

Work will be performed at the Installation and off-site Contractor offices as agreed to by both parties for proper performance of this task.

5.6 Privacy and Security

In order to ensure the security and orderly running of the Installation, any contractor personnel who wish to gain access to the Installation shall follow procedures established by the Installation. Due to security restrictions, details of these and other security procedures will be provided at a later date to the Contractor. However, the Contractor should account for potential delays due to DoD security requirements in its pricing.

[include narrative explanation of installation access/security requirements; specific access or notification processes for sites included in the PWS, etc.]

5.7 Staffing

The Contractor shall notify the COR of any changes in key personnel. The change of key personnel is subject to approval by the KO, although such approval will not be unreasonably withheld provided replacement personnel are of the same quality as originally proposed.

5.8 Stop Work

The Contractor, authorized Installation personnel, and the COR have the responsibility to stop work immediately if the work is considered to be a serious threat to the safety or health of workers, other personnel, or to the environment. Authorized Installation personnel include Installation safety officers, Environmental Division personnel, and command personnel with responsibility for overall Installation operations. When work is stopped due to a hazard/threat to worker safety, health, or the environment, the situation and resolution must be documented and submitted to the KO. Work must be stopped whenever chemical and biological warfare agents or radiological materials are encountered

5.9 Environmental Responsibility Considerations

- The Army will retain responsibility for any assessed natural resource damages that are attributed to historic releases of hazardous substances (prior to contract with contractor) and any injuries that are necessary and incidental to the reasonable implementation of a selected response or remedial action. The Contractor shall be responsible for any/all additional natural resource injuries and associated Natural Resource Damages claims brought as a result of its actions (e.g. release of hazardous substance or unreasonable disturbance of natural resources as a result of construction activities).
- [The following bullet will be installation-specific.] The Army will retain all responsibility for third party liability for CWM, MEC, or radiological material that are either targeted for or may be discovered during the course of remediation.
- Response cost claims, property damage and personal injury claims brought due to
 contamination and hazardous substance releases that have occurred historically (prior to
 contract with Contractor) and are not due to Contractor remediation activities are excluded
 from Contractor responsibility. The Contractor shall be responsible for and indemnify the
 Army for:
 - Any response cost claims for any environmental remediation services which the Contractor has assumed responsibility for under this PWS;
 - All costs associated with correction of a failure of any remedy implemented or
 operated and maintained by the Contractor to the extent such failure was caused by
 the willful or negligent acts or omissions of the Contractor in the course of
 performing the environmental services;
 - All personal injury or property damage claims to the extent caused by the acts or omissions of the Contractor in the course of performing the environmental services;
 - All natural resource damages pursuant to 42 U.S.C. Section 9607(a)(4)(C), to the extent that such damages were caused or contributed to by the actions of the Contractor or its successors in interest; and
 - All costs associated with or arising from any negligent acts or omissions or willful
 misconduct of the Contractor in the course of performing the environmental services
 or implementing remedial actions.

5.10 Organizational Conflicts of Interest

- 5.10.1 Disclosure. The Contractor shall provide a disclosure statement with its task order proposal, which concisely describes all relevant facts concerning any past or present organizational conflicts of interest relating to the work in each task order. In the same statement, the Contractor shall provide the information required in the following paragraph to assure the Government that the conflicts of interest have been mitigated and/or neutralized to the maximum extent possible. If a conflict of interest is discovered after task order award, the Contracting Officer will make a decision whether to terminate or rescind the task order and/or contract at that time.
- 5.10.2 Potential Conflicts of Interest. This request for proposals is open to any offeror to compete as a prime contractor, subcontractor or in any teaming arrangement. In order to avoid any organizational conflicts of interest, or even the appearance of any organizational conflicts of interest, any contractor performing environmental services work at the follow-on installation(s) under each task order will need to avoid, neutralize and/or mitigate -- prior to task order award significant potential conflicts of interest that may prejudice effective competition. The Contracting Officer has determined that at a

minimum contractors currently performing work on the identified installation(s) under each task order must ensure that all data pertaining to contamination at the sites compiled by or in the possession of such contractors shall be made available to all potential contractors in a timely fashion to the maximum extent possible by providing such data in to a data depository.

6.0 Installation and Site Information

This section is intended to provide the Contractor with general site background information to assist in the Contractor's identification of the specific sites and corresponding documentation/existing reports. The Army believes the information presented below is accurate. However, if there is a conflict between this information and other site documentation (the existing reports), the Contractor is solely responsible for reviewing all available information and forming their independent, professional conclusions/interpretation of site conditions and requirements to meet the objectives of this PWS. The following information is not intended as a substitute for complete analysis of technical data available. Nor is it intended to be a guide on how the Contractor should address achievement of the performance objectives/standards.

6.1 Installation Setting and Status

[Installation-specific background information inserted here.]

The following provides a description of the current site status for each of the sites identified in this PWS. These descriptions are based on the best information at the disposal of the Army, site conditions may have changed, and it is the responsibility of potential Contractors to attend the site visit, research, investigate, and reach their own conclusions regarding site conditions.

6.2 [Site Name]

Site Information

[Site-specific information inserted here.]

Most Recent Documentation

• [List of most recent documentation for site inserted here.]

7.0 Project Deliverables

Contractors should note:

- This project deliverables list is subject to change based on an alternative deliverables list proposed by the Contractor and approved by the Army through the COR.
- As noted in Section 3.13, all documents must be produced with at least draft, draft-final, and final versions. This requirement is subject to change based on Contractor negotiations with the Army and regulators and approved by the COR/KO.

Table 2: Proposed Project Deliverables.

| Deliverable Number | Deliverable Name |
|-----------------------|---|
| 1 | Final Project Management Plan/Quality Assurance Surveillance Plan |
| 2 | Additional Site Plans |
| 3 | Status Reports |
| 4 | Milestone Presentations |
| 5 | [Site] Documents (CERCLA) |
| 6 | [Site] Documents (Non-CERCLA) |
| 7 | Annual RA(O) Report(s) |
| 8 | RA(O) Exit/Ramp-Down Strategy Document(s) |
| 9 | Annual LTM Report(s) |
| 10 | LTM Exit/Ramp-Down Strategy Document(s) |
| 11 | CERCLA 121(c) Review Documents |
| 12 | CERCLA 121(c) Review Correction Documents |

Attachment A: Reference Documents

Contractors should note:

- These documents are available on [reference CD or website].
- The Army believes this documentation represents the most recent and appropriate documentation available for the Installation and sites identified in this PWS.
- Additional documentation is available through [other sources]. Specific documents may be made available following a request, if the documentation can be distributed in a timely manner. Electronic format is not guaranteed.

Table 4: Available Reference Documents.

| Title | Author | Date |
|--|--------|------|
| [Insert list of all available documents] | | |

Attachment B: List of Acronyms

AEDB-R Army Environmental Database - Restoration Module ARAR Applicable or Relevant and Appropriate Requirement

CAIS Chemical Agent Identification Sets

CERCLA Comprehensive Environmental Response, Compensation, and Liability Act

COR Contracting Officer's Representative

CWM Chemical Warfare Materiel

DERP Defense Environmental Restoration Program

DMM Discarded Military Munitions
DoD Department of Defense

ERIS Environmental Restoration Information System

FAR Federal Acquisition Regulation
FFA Federal Facility Agreement
FFPR Firm Fixed Price Remediation
GIS Geographic Information System

IAP Installation Action Plan IC Institutional Control

IRIS Integrated Risk Information System

KO Contracting Officer
LTM Long-Term Management
MCL Maximum Contaminant Level
MEC Munitions and Explosives of Concern

NCP National Oil and Hazardous Substances Contingency Plan NELAP National Environmental Laboratory Accreditation Program

NPL National Priorities List

OSHA Occupational Safety and Health Administration PBC Performance-Based Contract/Contracting

PMP Project Management Plan
PPE Personal Protective Equipment
PWS Performance Work Statement

QA Quality Assurance

QASP Quality Assurance Surveillance Plan

RAB Restoration Advisory Board RA(O) Remedial Action (Operations)

RC Response Complete

RCRA Resource Conservation and Recovery Act

RDX Royal Demolition eXplosive

RfD Reference Dose
RFQ Request for Quotation
RIP Remedy In Place
ROD Record of Decision

SARA Superfund Amendments and Reauthorization Act

SSHP Site Safety and Health Plan

TNT Trinitrotoluene

USAEC United States Army Environmental Center
USEPA United States Environmental Protection Agency

UST Underground Storage Tank
UXO Unexploded Ordnance

Attachment C: Definitions

Chemical Warfare Materiel (CWM): An item configured as a munitions containing a chemical substance that is intended to kill, seriously injure, or incapacitate a person through its physiological effects. CWM also includes V- and G- services nerve agent, H-series blister agent, and lewisite in other than munitions configurations. Due to their hazards, prevalence, and military-unique application, Chemical Agent Identification Sets (CAIS) are also considered CWM. CWM does not include: riot control agency, chemical herbicides, smoke and flame producing items, or soil, water, debris, or other media contaminated with chemical agent.

Deliverables: Documentation or data that support the completion of milestones or achievement of the performance objectives identified in this PWS.

Duration of the contract: The total period of performance to include option periods, if exercised.

Long-Term Management (LTM): The remedial phase including maintenance, monitoring, record keeping, remedy reviews, etc. initiated after response (removal or remedial) objectives have been met (i.e., after Response Complete).

Milestones: Significant events or activities that occur in the course of the Contractor achieving the performance objectives identified in this PWS.

Munitions and Explosives of Concern (MEC): This term, which distinguishes specific categories of military munitions that may pose unique explosives safety risks, means Unexploded Ordnance (UXO), as defined in 10 U.S.C. 2710 (e) (9); Discarded Military Munitions (DMM), as defined in 10 U.S.C. 2710 (e) (2); or Explosive munitions constituents (e.g., Trinitrotoluene (TNT), Royal Demolition eXplosive (RDX)) present in high enough concentrations to pose an explosive hazard.

PMP Documents: The original PMP (including project schedule), revisions, and status reports.

Project Documents (CERCLA): Documentation and data required by CERCLA remediation and RA(O) and/or LTM activities. These documents include the additional site plans referenced in Section 3.2.

[If applicable] Project Documents (UST, RCRA): Documentation and data required by underground storage tank (UST) or RCRA remediation and RA(O) and/or LTM activities.

Project-related information: All previous environmental restoration documentation of a technical nature developed by the Army and previous Army contractors and subcontractors during their work at the sites specified in this PWS, and all the documentation developed by the Contractor in order to achieve the performance objectives specified in this PWS.

Remedial Action (Operations) (RA(O)): The remedial phase during which the remedy is in place and operating to achieve the cleanup objective identified in the Record of Decision (ROD) or other formal decision document. Any system operation (long-term operations) or monitoring (long-term monitoring) requirements during this time are considered RA(O).

Remedy In Place (RIP): A final remedial action has been constructed and implemented and is operating as planned in the remedial design. An example of a remedy in place is a pump-and-

treat system that is installed, is operating as designed, and will continue to operate until cleanup levels have been attained. Because operation of the remedy is ongoing, the site cannot be considered Response Complete.

Resource-loaded Schedule: A schedule of due dates and cost expenditure percentages for all milestones and payable deliverables.

Response Complete (RC): The remedy is in place and the required remedial action-operations (RA-O) have been completed. If there is no RA-O phase and all response action objectives have been achieved and documented, then the remedial action-construction end date will also be the RC date.

Attachment D: Quality Assurance and Surveillance Plan (QASP) Template

1.0 Overview

This performance-based Quality Assurance Surveillance Plan (QASP) sets forth the procedures and guidance that the Contract Officer's Representative (COR) will use in evaluating the technical performance of the Contractor in accordance with the terms and conditions of the performance work statement (PWS). The QASP objective is to define Government procedures to be used to verify that appropriate performance and quality assurance methods are used in the management of this performance-based contract. The purpose of the QASP is to assure that performance of specific activities and completion of milestones are accomplished in accordance with all requirements set forth in the PWS.

This QASP describes the mechanism for documenting noteworthy accomplishments or discrepancies for work performed by the Contractor. Information generated from COR's surveillance activities will directly feed into performance discussions with the Contractor. The intent is to ensure that the Contractor performs in accordance with performance metrics set forth in the contract documents, the Army receives the quality of services called for in the contract, the Army only pays for the acceptable level of services received.

The QASP details how and when the COR will monitor, evaluate, and document Contractor performance on the PWS. The QASP is intended to accomplish the following:

- 1. Define the role and responsibilities of participating Army officials.
- 2. Define the key milestones/deliverables that will be assessed.
- 3. Define acceptable, superior, and unacceptable performance standards for key milestones/deliverables.
- 4. Describe the surveillance methodology that will be employed by the Army in assessing the Contractor's performance.
- 5. Describe the surveillance documentation process and provide copies of the form that the Army will use in evaluating the Contractor's performance.
- 6. Outline payment and corrective action procedures.

This QASP will be revised and finalized by the COR and Contractor upon completion of the Project Management Plan (PMP).

2.0 Roles and Responsibilities of Army Officials

The Contracting Officer's Representative (COR) is responsible for technical administration of the project and assures proper Army surveillance of the Contractor's performance. The COR is responsible for monitoring, assessing, recording, and reporting on the technical performance of the Contractor on a day-to-day basis.

The Contracting Officer (KO) has overall responsibility for overseeing the Contractor's performance. The KO is responsible for the day-to-day monitoring of the Contractor's performance in the areas of contract compliance, and contract administration; reviewing the COR's assessment of the Contractor's performance; and resolving all differences between the COR's assessment and the Contractor's assessment of performance. It is the KO that assures the Contractor receives impartial, fair, and equitable treatment under the contract. The KO is

ultimately responsible for the final determination of the adequacy of the Contractor's performance.

The COR and KO may call upon the technical expertise of other Army officials and subject matter experts (SME) as required. These Army officials/SMEs may be called upon to review technical documents and products generated by the Contractor. Contracting Agency representatives will also conduct review of contract documentation such as invoices, monthly status reports, and work plans.

3.0 Key Milestones/Deliverables to be Assessed

At a minimum, the following milestones and associated deliverables will be evaluated in accordance with this QASP (Based on milestones/deliverables in the PWS):

- Completion of the final Project Management Plan (PMP)
- Achievement of performance objective at each site specified in the PWS
- Completion of annual monitoring report(s)
- Completion of the final exit or ramp-down strategy for LTM/LTO
- Completion of final remedy review(s)
- Correction of deficiencies noted in the remedy review(s)
- Approved interim milestones identified in the final PMP

Additionally, the Army will evaluate performance on the key quality control activities and events specified by the Contractor through their Quality Assurance (QA) strategy (see PWS Section 3.3: Quality Management).

4.0 Performance Standards for Key Milestones/Deliverables

Because cost is fixed in the PBCs utilized by the Army, the Contractor's performance will be evaluated by assessing the key milestones/deliverables described above according to two standards: quality and timeliness. For each of these performance standards, the COR will assign one of three ratings of the Contractor's performance: superior, acceptable, or unacceptable (as shown in Table 1). Note: These performance standards may be modified to meet the needs of the Army.

Table 1 Performance Standards (Established and Defined by the Contractor in Conjunction with the COR)

| Performance | Superior | Acceptable | Unacceptable |
|-------------|--|---|--|
| Standard | Performance | Performance | Performance |
| Quality | Contractor exceeds the requirements in the PWS for the milestone/ deliverable. Deliverables /milestones are approved after one round of comments from Army and | Contractor meets the requirements in the PWS for the milestone/ deliverable. Deliverables /milestones are approved with two rounds of comments received from Army | Contractor does not meet the requirements in the PWS for the milestone/ deliverable. Deliverables/milestones require more than two rounds of Army and Regulators comments before being |

| | Regulators and no revisions are required. | and Regulators and no further revisions are required. | approved. |
|------------|---|--|--|
| Timeliness | Contractor provides acceptable milestone/deliverable ahead of the schedule outlined in the PMP. | Contractor provides milestone/deliverable according to the schedule outlined in the PMP. | Contractor provides milestone/deliverable behind the schedule outlined in the PMP |

If a milestone/deliverable is rated as being of unacceptable quality at the time that the PMP deadline for the milestone/deliverable expires, the milestone/deliverable will automatically receive an unacceptable rating for timeliness. At no point will a milestone/deliverable receive an acceptable or superior rating for timeliness if it is rated as being of unacceptable quality. Overall acceptable performance on a milestone/deliverable requires ratings of acceptable or superior for both the quality and timeliness standards.

5.0 Surveillance Methodology

The surveillance methods listed below will be used in the administration of this QASP.

100% Inspection

At the completion of all key milestones and deliverables, performance will be evaluated through 100% inspection (e.g., document review). The COR will document performance for each completed milestone/deliverable prior to payment, as described in Section 6.0.

Periodic Progress Inspection

At the COR's discretion, periodic inspections may be conducted to evaluate progress toward and/or completion of key milestones and deliverables. The COR may complete a periodic progress inspection if s/he believes that deficiencies exist that must be addressed prior to milestone/deliverable completion. While corrective action or re-performance will be required if necessary, the Contractor will not be financially penalized for unacceptable performance recorded in periodic progress reports, provided that final performance evaluation of the milestone/deliverable is deemed acceptable.

Customer Feedback

Additional feedback will be obtained through random customer complaints. To be considered valid, customer complaints must set forth clearly and in writing the detailed nature of the complaint, must be signed, and must be forwarded to the KO. The KO will maintain a summary log of all formally received customer complaints as well as a copy of each complaint in a documentation file.

6.0 Surveillance Documentation

The COR will use a performance evaluation form to record evaluation of the Contractor's performance for each milestone and deliverable in accordance with the methodology described in Sections 4.0 and 5.0. The COR must substantiate, through narratives in the form, all superior and unacceptable ratings. Performance at the acceptable level is expected from the Contractor. At a minimum, the evaluation form will indicate actual and scheduled delivery times and number of reviews required to achieve the final product.

The COR will forward copies of all completed performance evaluation forms to the KO and Contractor within one week of performing the inspection. When a milestone/deliverable receives an overall unacceptable rating, the Contractor will explain, within 15 days, in writing to COR why performance was unacceptable, how performance will be returned to acceptable levels, and how recurrence of the problem will be prevented in the future.

The KO will review each performance evaluation form prepared by the COR. When appropriate, the KO may investigate further to determine if all the facts and circumstances surrounding the event were considered in the COR opinions outlined on the form. The KO will immediately discuss any unacceptable rating with the Contractor to assure that corrective action is promptly initiated.

At the end of every year, the COR will prepare a written report for the KO summarizing the overall results of his/her surveillance of the Contractor's performance during the previous 12 months. This report will become part of the formal QA documentation.

The COR will maintain a complete QA file. This file will contain copies of all performance evaluation forms and any other related documentation. The COR will forward these records to the KO at termination or completion of the contract.

7.0 Payment and Corrective Action

Full payment for a milestone/deliverable will be provided upon verification of overall acceptable performance, as rated on quality and timeliness. This verification will be recorded in a performance evaluation form submitted to the KO specifying overall Contractor performance as either acceptable or superior for the milestone/deliverable.

If a milestone/deliverable receives an unacceptable rating for the quality performance standard, re-performance is required until the milestone/deliverable receives an acceptable rating. This reperformance is required regardless of cost or schedule constraints that may result from the unacceptable performance, unless the KO has opted to terminate the contract.

Table 2 summarizes the minimum key elements planned for the QASP. The final QASP will be developed with the COR and the contractor and will be based on the final PMP.

Additional Government surveillance activities may include, but are not limited to, the following:

- 1) Work plan review and approval
- 2) Oversight of drilling, field sampling activities
- 3) Oversight of all waste management functions/responsibilities
- 4) Review of all waste management documentation
- 5) Separate/split laboratory QA samples
- 6) Review and approval of all access agreements associated with off-site areas
- 7) Review and approval of meeting minutes from RAB/BCT meetings
- 8) Review and approval of all deliverables to regulatory agencies
- 9) Review and approval of FS options to be considered
- 10) Review of quality control documentation
- 11) Review of project safety record
- 12) Adherence to the approved work plan

Table 2 Performance Objectives, Acceptance Criteria, and Monitoring Methods

| Performance Objectives (from Table 1 in | Performance Standard (from | Acceptable | Monitoring Method |
|---|---|---|--|
| PWS) | Table 1 in PWS) | Quality Levels | |
| PWS) Approved Project Management Plan (PMP) and Quality Assurance Surveillance Plan (QASP): • Draft PMP and QASP within 30 days of Task Order award, • Final PMP and QASP within 30 days of receipt of COR comments on the drafts. | Table 1 in PWS) 1. Army approval through the COR | Quality Levels Acceptable or superior performance, as defined in the QASP | 100% inspection of milestones / deliverables associated with objective • Interim Payment schedule included in the PMP. • Resource loaded scheduled included in the PMP |
| | | | Project Status reports provided as proposed |

SAMPLE

QUALITY ASSURANCE MONITORING FORM

| Date:/ |
|--|
| Work Task (Milestone/Activity): |
| Survey Period:/ through/ Method of Surveillance: COR Review |
| Evaluation of Contractor's Performance: |
| |
| |
| |
| |
| |
| Corrective Action Required: |
| Narrative Discussion of Contractor's Performance During Survey Period: |
| Discussion |
| |
| |
| |
| |

CORRECTIVE ACTION FORM FOR QASP

| 1) Work Task (Milestone/Activity): | | | |
|--|--|--|--|
| 2) Survey Period:/ through/ | | | |
| 3) Description of the Failure/Deficiency that Precipitated the Corrective Action: Description | | | |
| Description | | | |
| | | | |
| 4) Description of the Criterion that the Failure/Deficiency was Evaluated Against: Description | | | |
| Description | | | |
| | | | |
| 5) Personnel Involved in the Identification of the Failure/Deficiency, Determination of the Appropriate Corrective Action, Approval of the Corrective Action, and Implementation of the Corrective Action: | | | |
| | | | |
| | | | |
| 6) Description of the Corrective Action that was Required: | | | |
| Description | | | |
| | | | |
| 7) Date/Time of Implementation of the Corrective Action:/ | | | |
| Description | | | |
| | | | |
| | | | |
| 8) Follow-Up Information to Prevent Recurrence of Failure/ Deficiency (i.e., Need For Revision of Procedures or Specifications): | | | |
| | | | |
| | | | |

9) Personnel Responsible for Follow-Up Work:

| 10) Planned Date for Follow-Up Surveillance:/ | |
|---|--|
| 11) Other Notes: | |
| Other | |
| | |